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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/944,745	08/31/2001	Christian Weber	10191/1908	1989

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NEW YORK, NY 10004

EXAMINER

HARTMAN JR, RONALD D

ART UNIT	PAPER NUMBER
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2121

DATE MAILED: 02/09/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/944,745

Applicant(s)

WEBER, CHRISTIAN

Examiner

Ronald D Hartman Jr.

Art Unit

2121

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 19 July 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-10 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 7/19/2004 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

1. Claims 1-10 are presented for further examination.

Drawings

2. It is noted that the applicant has made some amendment to the drawings, in response to the last office action. The changes submitted by the applicant did not address Figure 2, elements 100 using "Betriebsgr", element 102 using "vorl." and element 106 using "vorl." And Figure 3, elements 200, 202, 212 and 222 using "vorl."

Corrections are required in response to this office action.

Specification

3. [0010], line 4 refers to the communication system as element 8, when it appears it should be listed as element 18 in accordance with Figure 2.

Claim Rejections - 35 USC § 112

4. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

Claims 4-7 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter that was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

As per claims 4-7, specifically claim 4, the claimed changing of a maximum offset, as a function of zero crossings, is not adequately disclosed by the specification

as originally filed. The examiner is not sure as to what is meant by zero crossings and how it interrelates with the offset value. Therefore, the examiner has interpreted "zero crossings" in light of the disclosure provided by Boger et al. Suffice to say, the zero crossings appear to be representative of a phase relationship wherein this phase relationship provides for the ability to determine whether or not limit cycling is occurring. However, since the examiner will not speculate as to the intended meaning of any limitations, any and all rejections under prior art will be held in abeyance until such time that meaningful claims are presented with respect to at least claims 4-7.

Claim Rejections - 35 USC § 102

5. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-3 and 8-10 are rejected under 35 U.S.C. 102(e) as being anticipated by Boger et al., U.S. Patent No. 6,272,401.

As per claims 1 and 9-10, Boger et al. teaches a device comprising:

- a control device that includes at least one microcomputer (e.g. Figure 1 element 18) and that forms a variable drive signal quantity (e.g. "OUT" of Figure 1 element 20) for driving the final controlling element (e.g. Figure 1 element 26 or 26) in accordance with at least one program (e.g. "routines"; Abstract and C1 L9-12 and C1 L38-43) executed by the microcomputer, wherein the program corrects the variable drive signal quantity as a function of change over time (e.g.

changes over time is inherent to the use of both position and pressure feedback signals for controlling/maintaining/adjusting the operations of the valve and or actuator).

As per claims 2 and 8, Boger et al. teaches the use of offset values (e.g. BIAS; C9 L26-29) which are based on the changes which occur over time with respect to the variable drive quantity (e.g. C9 L35-52).

As per claim 3, Boger et al. teaches the BIAS value, which is equivalent to the claimed "offset value" reaching a value of zero and this value appears to be the limit and therefore a maximum offset value is contemplated by the BIAS value reaching zero since this is appears to be the limit to which the value can go.

Response to Arguments

6. Upon reviewing the prosecution history of the instant applicant, it has occurred to the newly appointed examiner that perhaps a bit of explanation with regards to the examiner's interpretation of several key concepts is necessitated.

First and most importantly, the applicant's claiming of a "hysteresis-exhibiting final controlling element", in light of Webster's Dictionary's, Ninth Edition, definition for hysteresis which states "the lagging of an effect behind its cause...", appears to be the applicants attempt at claiming subject matter that is inherent to valve actuator movements since there inherently exists a delay, however slight, in the physical movement of any valve with respect to the reaction of the valve to the movement command received by the valve.

Therefore, since hysteresis for a valve is believed to be a feature that is inherent because of having to overcome friction within the valve itself, this limitation is considered to be met by Boger et al. since every valve suffers from a delay, and regardless if the delay is compensated for or not, the delay inherently exists.

Applicant's arguments have been considered and are considered moot in light of the new grounds of rejection set forth above in this office action.

Conclusion

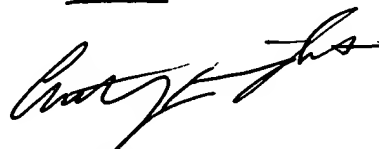
7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ronald D Hartman Jr. whose telephone number is (571) 272 - 3684. The examiner can normally be reached on Mon. - Fri., 11:30 am - 8:00 pm EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Anthony Knight can be reached at (571) 272 - 3687. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Ronald D Hartman Jr.
Patent Examiner
Art Unit 2121

X RDH



Anthony Knight
Supervisory Patent Examiner
Group 3600